

CLAIMS

1. An electrical connector comprising an insulative housing and a plurality of terminals, the housing providing a protective shroud around said terminals, and an alignment plate member, said alignment plate member being movable along said terminals in a mating direction of said terminals when mated with a complementary electrical connector, said terminals being mounted in an array on a printed circuit board, with said housing being attached to said printed circuit board, said alignment plate member being movable from a first position adjacent to free ends of said terminals, to a second position adjacent said printed circuit board.
2. The electrical connector of claim 1, further comprising locating elements on said alignment plate member and on said protective shroud to position said alignment plate member relative to said terminals.
3. The electrical connector of claim 2, wherein said locating elements on said alignment plate provide a stand-off feature which contacts the printed circuit board.
4. The electrical connector of claim 2, wherein said locating elements comprise locating lugs on said alignment plate member, and channels surrounding a perimeter of said protective shroud profiled to receive said lugs, said lugs having a laterally extending portion and a stand-off foot portion.
5. The electrical connector of claim 1, further comprising a latching element to latch said alignment plate in said first position.
6. The electrical connector of claim 1, further comprising posts extending upwardly from said alignment plate for alignment with a complementary connector when mated to prevent misalignment.

7. An electrical connector assembly, comprising:

a socket connector comprising:

a plurality of socket terminals being mounted in an array on a printed circuit board;

an insulative socket housing providing a protective shroud around said terminals; and

an alignment plate being movable along said terminals in a mating direction of said terminals, the alignment plate being movable from a first position adjacent to free ends of said terminals, to a second position adjacent said printed circuit board; and

a plug connector comprising:

a plug housing profiled for mating reception in said protective shroud; and

a plurality of plug terminals electrically connectable with said socket terminals.

8. The assembly of claim 7, wherein the socket terminals are profiled as a plurality of posts upstanding from said printed circuit board.

9. The assembly of claim 8, wherein said plug housing has a front mating face with apertures complementarily located to receive said socket posts.

10. The assembly of claim 9, wherein said alignment plate further comprises insulative aligning posts upstanding therefrom and extending outwardly, and the plug housing front mating face including alignment openings to receive said aligning posts.

11. The assembly of claim 10, wherein said aligning posts extend out a distance greater than said socket terminal posts.

12. The assembly of claim 10, wherein said plug and socket connectors having latching detents cooperatively provided on the socket and plug housings to temporarily hold the housings together in an unmated condition.

13. The assembly of claim 12, wherein said detents are provided on exterior endwalls of said plug housing, and on interior endwalls of said socket housing.

14. The assembly of claim 12, wherein said detents are so positioned on said socket and plug housings such that when said housings are held by said detents, said aligning posts are partially inserted in respective alignment openings, but said socket and plug terminals are disengaged.

15. The assembly of claim 6, further comprising a latching assembly cooperatively provided by said socket housing and said alignment plate to latch said alignment plate in said first position.

16. The assembly of claim 15, wherein said plug housing includes a disengagement element to disengage said latching assembly, to allow said alignment plate to be moved to said second position by the movement of said plug housing.

17. An electrical connector, comprising:

a plurality of socket terminals being mounted in an array on a printed circuit board;

an insulative shroud around said terminals; and

an alignment plate being movable along said terminals in a mating direction of said terminals, the alignment plate being movable from a first position adjacent to free ends of said terminals, to a second position against said printed circuit board.

18. The electrical connector of claim 17, further comprising locating elements on said alignment plate and on said protective shroud to position said alignment plate relative to said terminals.

19. The electrical connector of claim 17, further comprising a latching element to latch said alignment plate in said first position.

20. The electrical connector of claim 17, further comprising posts extending upwardly from said alignment plate for alignment with a complementary connector when mated to prevent misalignment.